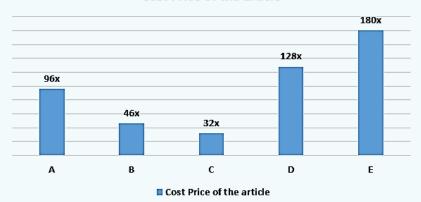


Directions: Answer the questions based on the information given below.

The given bar graph shows the cost price of five different articles. If the cost price is less than Rs. 1500, then it is marked up by 20% and if the cost price is more than Rs. 1500 then it is marked up by 25%. If the marked price of the item is less than Rs. 3500, then the discount offered is 15% and if the marked price is more than Rs. 3500 then the discount offered is 20%. The sum of the cost price of all the articles is Rs. 12100.

Cost Price of the article







- 1. If the cost price of the article 'D' had been 80% less then find the difference between the original selling price and the new selling price of the article.
- (a) Rs. 2432.8
- (b) Rs. 2642.4
- (c) Rs. 2839.6
- (d) Rs. 2547.2





- 2. If the selling price of the article 'B' had been Rs. 680 more and the discount percentage remained the same, then find the amount by which article 'B' is marked up provided the article is sold at 75% profit.
- (a) Rs. 1324
- (b) Rs. 1260
- (c) Rs. 1152
- (d) Rs. 1458





- 3. If the article 'A' has been marked up by 30% and same discount amount was offered on it as before, then find the difference between the new selling price and the original selling price.
- (a) Rs. 135
- (b) Rs. 120
- (c) Rs. 180
- (d) Rs. 175
- (e) Rs. 200





- 4. Due to some breakage, the shopkeeper had to spent Rs. 250 on article 'C' and then marked it up above its effective cost price and provided discount, by same percentages. The new selling price is how much percent more/less than the original selling price.
- (a) 31.25%
- (b) 42.75%
- (c) 28.45%
- (d) 30.15%





- 5. If the article 'E' had been sold at a loss of 20%, then find the discount percentage offered on it, given the article is marked up above its cost price by the same percentage.
- (a) 52%
- (b) 24%
- (c) 42%
- (d) 36%





	Cost price of the article (in Rs.)	Marked price of the article (in Rs.)	Discount offered on the article (in Rs.)	Selling price of the article (in Rs.)
Α	96x = 2400	1.25 × 2400 = 3000	0.15 × 3000 = 450	3000 – 450 = 2550
В	48x = 1200	1.2 × 1200 = 2440	0.15 × 1440 = 216	1440 – 216 = 1225
С	32x = 800	1.2 × 800 = 960	0.15 × 960 = 144	960 – 144 = 816
D	128x = 3200	1.25 × 3200 = 4000	0.2 × 4000 = 800	4000 - 800 = 3200
E	180x = 4500	1.25 × 4500 = 5625	0.2 × 5625 = 1125	5625 – 1125 = 4500

1. Answer: D

- Sol. New cost price of the article = 0.2 × 3200 = Rs. 640
 Therefore, marked price of the article = 1.2 × 640 = Rs.768
 New selling price of the article = 0.85 × 768 = Rs. 652.8
 Required difference = 3200 652.8 = Rs. 2547.2
- 2. Answer: C
- Sol. New selling price of article 'B' = 1224 + 680 = Rs. 1904

 New marked price of the article 'B' = 1904/0.85 = Rs. 2240

 New cost price of the article 'B' = 1904/1.75 = Rs. 1088

 Amount by which article 'B' is marked up = 2240 1088 = Rs. 1152
- 3. Answer: B
- Sol. New marked price of the article 'A' = 1.3 × 2400 = Rs.3120 New selling price = 3120 - 450 = Rs. 2670 Required difference = 2670 - 2550 = Rs. 120
- 4. Answer: A
- Sol. New cost price of the article = Rs. (800 + 250) = Rs. 1050 New marked price = 1.2 × 1050 = Rs. 1260 New selling price = 0.85 × 1260 = Rs. 1071 Required percentage change = {(1071 - 816)/816} × 100 = 31.25%
- 5. Answer: D
- Sol. New selling price = 0.8 × 4500 = Rs. 3600 Required discount percentage = {(5625 – 3600)/5625} × 100 = 36%

